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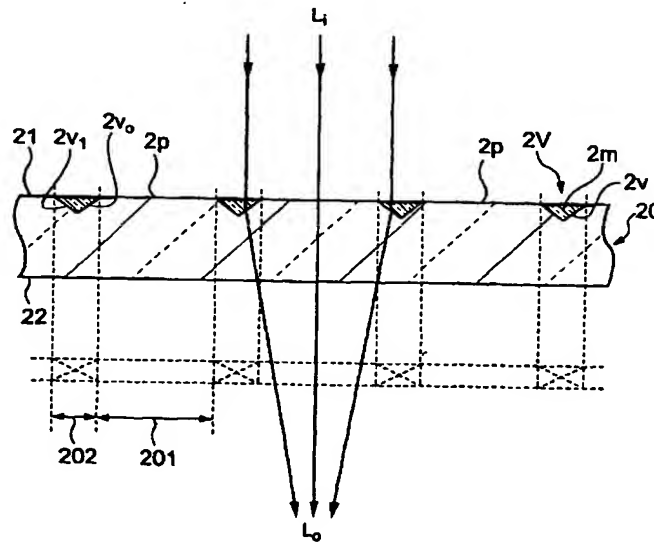
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- (71) Applicant (for all designated States except US): KONINKLIJKE PHILIPS ELECTRONICS N.V. [NL/NL]; Groenewoudseweg 1, NL-5621 BA Eindhoven (NL).
- (72) Inventor; and
- (75) Inventor/Applicant (for US only): SHIBAZAKI, Minoru [JP/JP]; c/o Philips Japan, Ltd., Philips Bldg., 2-13-37 Kohnan, Minato-ku, Tokyo 108-8507 (JP).
- (74) Agent: AOKI, Hiroyoshi; c/o Philips Japan, Ltd., Philips Bldg., 2-13-37, Kohnan, Minato-ku, Tokyo 108-8507 (JP).
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(54) Title: OPTICAL SUBSTRATE, DISPLAY DEVICE USING THE SAME AND THEIR MANUFACTURING METHODS



(57) Abstract: An object of the invention is to provide an optical collective substrate and a display device using it, which can make effective use of light while avoiding generation of chromatic aberration in transmitted light. An optical substrate (20) of an optically transmissive material having a structure in which incident light  $L_i$  from one principal plane (21) side of the substrate is locally focused toward an array of apertures (201) formed on the other principal plane (22). The one principal plane (21) is provided with grooves 2v being filled with an optically transmissive substance 2m of a predetermined refractive index, the filled groove portions 2v allowing the incident light  $L_i$  from the one principal plane (21) side to be collected onto the respective apertures (201).